

REMARKS/ARGUMENTS

Applicants received the Office Action dated October 16, 2007, in which the Examiner: 1) rejected claims 1-2, 4-5, 8-13 and 15-20 under 35 U.S.C. § 102(b) as anticipated by Menezes (U.S. Pat. No. 6,845,456); 2) rejected claim 3 under 35 U.S.C. § 103(a) as obvious over Menezes in view of Duley;¹ and 3) rejected claim 7 as obvious over Menezes in view of Atkinson (U.S. Pat. No. 5,991,883). With this Response, Applicants have amended claims 1, 12, 16, and 18. Based on the amendments and arguments contained herein, Applicants believe this case to be in condition for allowance.

I. REJECTIONS UNDER U.S.C. § 102(b)

Applicants amend claim 1 to define the “operating voltage” to be the “output voltage of a power supply and is at a first voltage level if the system is connected to an external source of alternating current (AC) power and is at a second voltage level if the system is connected to an external source of direct current (DC) power.” This amendment is supported at least by Figure 1 which shows an “AC IN” power source and a “DC IN” power source. See also, pp. 2-3, para. [0008].

Menezes mentions “a plurality of processor states, generally based on unique voltage/frequency pairs.” Col. 4, lines 39-42. Menezes, however, does not teach or even suggest forcing an electrical load to operate in a reduced power state based on the system’s “operating voltage,” as further defined by way of the amendment. Specifically, Menezes does not disclose forcing a load to operate in a reduced power state based on the operating voltage output of a power supply, the power supply’s output voltage being a first voltage level if the system is connected to an external source of AC power and is at a second voltage level if the system is connected to an external source of DC power. Instead, Fig. 2 of Menezes shows that the performance of the system is increased or decreased

¹ The ground of rejection of claim 3 is unclear. The Examiner stated that claim 3 was being rejected as obvious over Menezes, but referred to only Duley in the explanation. Applicants assume the ground of rejection is obviousness over the combination of Menezes in view of Duley. Clarification is respectfully requested.

based on a comparison of the utilization rate to high and low trigger points. Applicants have claimed a substantially different technique for basing a decision as to when to operate a load in a reduced power state. For at least this reason, claim 1 and all claims dependent thereon are in condition for allowance over Menezes.

Claim 2 depends from claim 1 and requires “a pair of comparators coupling the operating voltage to inputs of the power management logic, each comparator having a reference voltage different from each other.” The Examiner identified Menezes at col. 4, lines 39-52 for allegedly teaching this limitation. This passage refers to Fig. 2 which provides a flow chart in which the system’s utilization rate is compared to high and low trigger threshold values. This is clearly not the same as a pair of comparators coupled to the operating voltage with each comparator having a different reference voltage. For this additional reason, claim 2 is allowable.

Claim 12 requires a power management means for forcing the system to operate in a reduced power state when an operating voltage is between two voltage levels. As amended, the operating voltage has been defined to by “an output voltage of a power supply and said operating voltage is at a first voltage level if the system is connected to an external source of alternating current (AC) power and is at a second voltage level if the system is connected to an external source of direct current (DC) power.” As explained above, Menezes has no such limitation. For at least this reason, claim 12 and all claims dependent thereon are in condition for allowance over Menezes.

Claim 15 depends from claim 12 and requires “means for determining whether the operating voltage is between the two voltage levels.” This limitation is written in a means plus function format to invoke 35 U.S.C. § 112, sixth paragraph. As such, the quoted limitation of claim 15 is limited to just the structure provided in Applicant’s specification, and equivalent structure, for performing the claimed function. The disclosed structure is a pair of comparators 114, 115 as shown in Figure 1. As explained above regarding claim 2, Menezes has no such comparators. Claim 15 is allowable for this additional reason.

Claim 16 is directed to a power management logic that comprises control logic that causes a system to operate in a reduced performance mode if the operating voltage for a load is between two reference voltages. As amended, the operating voltage has been defined to by “an output voltage of a power supply and said operating voltage is at a first voltage level if the system is connected to an external source of alternating current (AC) power and is at a second voltage level if the system is connected to an external source of direct current (DC) power.” As explained above, Menezes has no such limitation. For at least this reason, claim 16 and all claims dependent thereon are in condition for allowance over Menezes.

Claim 18 is directed to a method of comparing an operating voltage to reference voltages and requiring a system to operate in a less than fully performance mode when the operating voltage is between the reference voltages. Claim 18 has been amended to specify that the operating voltage is “an output voltage of a power supply and is at a first voltage level if the system is connected to an external source of alternating current (AC) power and is at a second voltage level if the system is connected to an external source of direct current (DC) power.” As explained above, Menezes has no such limitation. For at least this reason, claim 18 and all claims dependent thereon are in condition for allowance over Menezes.

II. REJECTIONS UNDER U.S.C. § 103(a)

Claims 3 and 7 depend from claim 1. Duley does not satisfy the deficiency of Menezes explained above. Thus, claims 3 and 7 are patentable over Menezes combined with the Duley for at least the same reason provided above regarding claim 1.

III. CONCLUSION

Applicants respectfully request reconsideration and that a timely Notice of Allowance be issued in this case. It is believed that no extensions of time or fees are required, beyond those that may otherwise be provided for in documents accompanying this paper. However, in the event that additional extensions of time are necessary to allow consideration of this paper, such extensions are

Appl. No. 10/734,938
Amdt. dated January 9, 2008
Reply to Office Action of October 16, 2007

hereby petitioned under 37 C.F.R. § 1.136(a), and any fees required (including fees for net addition of claims) are hereby authorized to be charged to Hewlett-Packard Development Company's Deposit Account No. 08-2025.

Respectfully submitted,

/Jonathan M. Harris/

Jonathan M. Harris
PTO Reg. No. 44,144
CONLEY ROSE, P.C.
(713) 238-8000 (Phone)
(713) 238-8008 (Fax)
ATTORNEY FOR APPLICANTS

HEWLETT-PACKARD COMPANY
Intellectual Property Administration
Legal Dept., M/S 35
P.O. Box 272400
Fort Collins, CO 80527-2400